

Town of Harpswell Open Space Plan



March 2009

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Acknowledgements

The Open Space Plan was prepared by the Harpswell Conservation Commission.

A special thanks to the townspeople who helped start the process by returning the mail questionnaires and attending the public workshops and also individuals who attended the Commission's weekly workshop meetings.

Project assistance and guidance was provided by FB Environmental, Portland, ME and MRLD Planners, Yarmouth, ME, the Harpswell Planning Office, Marcel Polak, Advisor, Maine Association of Conservation Commissions and Reed Coles, Executive Director, Harpswell Heritage Land Trust.

Additional assistance came from the Town's Assessing, Codes Enforcement Treasurer's Offices, the Town Lands, Recreation, and Comprehensive Plan Implementation Committees and the Town administrator's staff.

Additionally Maine communities and organizations produced documents that were helpful for insights and the development of the Harpswell Open Space Plan. Readfield's 2006 *Open Space Plan* provided a framework and Searsmont's *Land Stewardship Incentives and Education Project* provided a wealth of possible open space funding sources and strategies, as did Falmouth's 2005 open space plan update, *The Greening of Falmouth*. Given its immediate proximity to Harpswell, Brunswick's 2002 *Parks, Recreation and Open Space Plan* also provided some valuable insight; The Nature Conservancy, Brunswick office provided mapping strategies and the Maine Coast Heritage Trust provided helpful information regarding the use of voluntary open space protection tools.

Funding for the Plan was provided by a grant from the William P. Wharton Trust and countless hours volunteered by the Conservation Commission members.

We want to thank all who provided the photos that enable us to become more familiar with the diversity and uniqueness of Harpswell. Some contributors include: Tony Barrett, L. Bayless, Liz Bouve, Pat L'Heureux, Elsa Martz, Mary Ann Nahf, Sue Rich and the Town Lands Committee.

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Executive Summary

In 2006, the Harpswell Conservation Commission (HCC) was asked to help with the execution of sections of the Town's *2005 Comprehensive Plan Update* that dealt with the conservation of open space and the direction of future growth. This was to be accomplished with an Open Space Plan for Harpswell.

In order to achieve the goals for open space expressed by residents in the 2005 Comprehensive Plan Update, the Conservation Commission prepared an Open Space Plan that suggests ways to protect a portion of undeveloped land, preserve the natural and scenic assets of the Town and preserve the quality of living we enjoy in Harpswell. The Open Space Plan outlines approaches to provide for orderly residential development, enhance recreational opportunities and contribute to the health of Harpswell's critical marine economy.

As part of the development of the plan, community input was solicited from the townspeople by gathering information through a mailed questionnaire and by holding two open space planning workshops. Participants identified which natural, scenic and recreational resources were important to them and helped inventory lands that had these resources.

Using the residents' prioritizations, the HCC identified five (5) key resources in Harpswell that participants wanted to protect in the future. These resources include 1) fresh, salt and groundwater, 2) high value habitats, 3) scenic splendor, 4) recreational opportunities and 5) cultural/historic/civic locations.

In order to identify the most important large uninhabited areas in Town which contained these resources, the HCC used a series of maps to determine the location of our most important water resources and habitat areas in Harpswell. The HCC also considered factors, such as proximity to a protected site, size of parcel, lineal opportunity for expansion of recreation, continuity for the benefit of wildlife and bird populations and protection of lands draining into wetlands, ponds and mudflats.

The data was analyzed to determine which locations scored the highest resource ratings and which were also designated as critical or endangered by the United States Fish and Wildlife Program. Next, all of the developed properties with buildings were identified on the maps, as well as, those that were already protected as a result of ownership by conservation, government or civic groups. As a result of this process, 12 Focus Areas were chosen for preservation.

These Focus Areas and Harpswell's undeveloped islands over (1) acre, should be at the center of the Town's future open space protection efforts. Most of this land has limited development, high ecological value and is privately owned by conservation-minded residents, living in the area, who have kept it in its current undeveloped condition. This is considered the most vital land to preserve.

A coordinated conservation strategy to protect the key natural resources includes:

- Identification of vernal pools and the updating of wetland protection
- Education about the various methods of open space preservation
- Continued preservation of our protected lands
- Review of land-use ordinances to consider open space in development
- Strategic purchase or acquisition of Harpswell land from willing sellers or donors

While these strategies are designed to protect the land in the high priority Focus Areas, they are also intended for use throughout Harpswell to preserve its high-value natural areas.

The Town recognizes that privately owned property may be the principal asset of its owners and that it may have significant historic value to families. This Plan respects such factors and does not include any proposal whose effect would have a harmful impact on the real or historic value of private property.

We are asking the residents of Harpswell for their approval of the final Plan when presented at Town Meeting in March, 2009. As we move forward in the implementation of this Open Space Plan, we hope to achieve our shared vision for the Town of Harpswell that includes:

- Preservation of open space for future generations to enjoy
- Preservation of water quality
- Preservation and stewardship of high value natural areas
- Preservation of community character that is defined by our seafaring and farming heritage
- Collaboration to plan for, protect and manage the Town's open space resources

1. Introduction

Our coast isn't all rock and mudflats. Where the shore is protected from turbulent waters, and where sediment is washed into the sea, a unique process takes place. It only takes a few hundred years. The result is a coastal wetland, or salt marsh...As Harpswell continues to develop, it is important to remember the land-sea connection and protect these "nurseries of the sea."¹



The Town of Harpswell has always had a close connection to the sea. The sea has been at the base of the Harpswell economy and quality of place, and it remains the heart and future of the community of 5,239 people. The town's long narrow peninsula, Harpswell Neck and three large islands, Great, Orr's and Bailey, stretch 15 miles into Casco Bay. Together with over 83 offshore islands, they give Harpswell 216 miles of oceanfront, the longest of any town in the state. Its 15,700² acres of land have a rich and

diverse marine-forest environment. Outside of the densely developed residential and commercial fishing areas, most of the land is forested down to the sea, tidal flats and coastal marshes. The forest also has many freshwater wetlands of varying size and ecological importance that are essential for the health of plant, animal and town.

Families who have lived in Harpswell for a lifetime, even generations, can remember when the Town had a small year-round population living in villages and small neighborhoods along its narrow peninsula and islands. There were long stretches of forest, wetland and field between centers. Summers brought vacationers seeking the shore who doubled the population. Today many of these fields and forests are gone replaced by homes as more people move to enjoy Harpswell's amenities. An average of 42 new homes per year have been built in the last five (5) years. Full time and part time residents alike speak of the importance of preserving water resources and keeping Harpswell "the way it's always been".

¹ Where Fresh Water Meets the Sea – Harpswell's Coastal Wetlands. Anne Perry, Harpswell Conservation Commission, Harpswell Anchor July 2008

² These numbers are approximate. The 2005 Comprehensive Plan for Harpswell states that the town has about 24.6 square miles or 15,744 acres at 640 acres per square mile. In 2008, the Assessor's Office data base showed the total acres in town were 15,469 acres. The State of Maine uses the figure of 15,342 square miles for Harpswell. In this document, we have chosen to use 24.6 square miles or 15,744 square miles to do our calculations. Throughout the document, we state that Harpswell has approximately 15,700 acres.

The Town's 2005 Comprehensive Plan identified the citizens' goal of preserving the physical character of the Town by protecting its significant wildlife habitat, its biodiversity and the health of its critical marine resources, i.e. eelgrass beds and mud flats. A healthy marine economy will preserve the community's fishing heritage and its heritage as a tourist, seasonal and recreational haven.³ As citizens have seen, growth in the Town is inevitable and will continue for years to come. Now we are presented with the challenge of how to accommodate future residential growth while retaining open natural areas that alternate with the coastal village and rural pattern that is desired by Harpswell citizens.

2. What is Open Space and Why is it Valuable?

2A. Definition of Open Space

Generally speaking, open space is undeveloped land. It may be a vista in the distance or a privately owned piece of land that provides wildlife habitat, contributes to flood control, or is used for farming or recreation. In addition, while not strictly open space, the Plan includes the cultural, historic and recreational resources that contribute to Harpswell's quality of place and are part of its seafaring and rural heritage. Such traditional livelihoods as ship-building, ice making, salt processing, milling maize, farming and corralling wayward cattle have all left vestiges of these past industries for future generations to savor. Many of these resources are already protected, contain open space or adjoin open space land.

Definition of Open Space

Harpswell's Open Space Plan defines *open space* as land in a predominantly undeveloped condition. It may be preserved or managed in order to maintain the natural, scenic, ecological, cultural, hydrological or geological properties of the land. In addition, while not strictly open space, the Plan includes areas that provide cultural, historic, and recreational resources that contribute to Harpswell's quality of place and are part of its seafaring and rural heritage.

Open space land provides five (5) major resources that contribute to the quality and character of Harpswell's open space.

1. Our Water Resources vary, but they all provide:

- retention areas that collect stormwater runoff and prevent flooding.
- natural habitats for a variety of plant and wildlife species
- valuable homes for anadromous and estuarine fish⁴

³ *2005 Harpswell Comprehensive Plan Update*, page 17

⁴ *Drinking Water and Sanitary Septic Study Update Ransom Environmental Consultants, Inc.*



Bethel Point Wetland and *Long Reach Bog* are examples of **freshwater wetlands** that recharge the groundwater supply and filter water running into the bay, enhancing marine life habitat.



Coastal Marshes not only receive upland runoff, but provide a fresh and saltwater exchange area, creating an environment that 60% of our commercial fish species use in their life cycle. (See **Appendix 1A and 1B** for a summary and inventory of our wetlands.)

Ponds are a crucial water resource. Many provide cover at the water's edge, making them ideal habitat for wildlife. In addition, ponds provide a sense of

wellbeing whether it be watching the Canada geese grazing near the shore on an autumn day; or while we watch the neighborhood hockey team using it for a practice rink during the winter. Ponds provide a freshwater source for our local volunteer firemen to refill their fire trucks. There are eight (8) dry-hydrants located on our ponds. (See **Appendix 2A and 2B** for a summary and inventory of ponds)



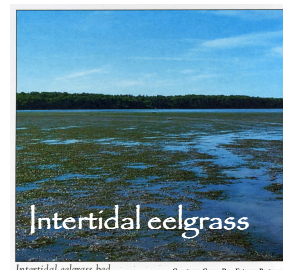


Strawberry Creek

Healthy **shellfish beds and eelgrass habitat** are crucial for clamming and lobstering. Eelgrass beds provide nutrients and cover for marine creatures, supplying a healthy environment for mollusks and worms. Our marine economy is the core of our local economy. Harpswell is one of the major commercial fishing centers in Cumberland County, second only to Portland.

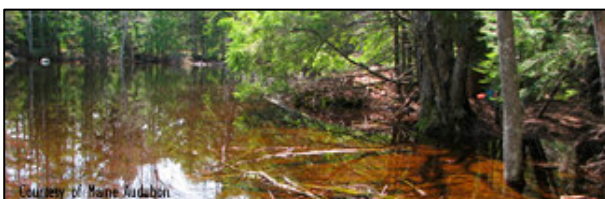
In 2005, commercial

fisheries in Cumberland County landed 28 different types of fish. Lobster represented 58.4% of the total dollar amount, followed by soft shelled clams (4.6%). Harpswell also has an extensive bloodworm market. When we protect our water resources, we protect Harpswell's valuable commercial fisheries.



Intertidal eelgrass

Intertidal eelgrass bed Courtesy: Casco Bay Estuary Partnership



Courtesy: Maine Audubon

Vernal or springtime pools are temporary wetlands that play a crucial role in forest and meadow ecosystems⁵. Generally, they have no inlet or outlet but catch melting snow and rain and let it drain slowly into the ground or

evaporate. Several species of amphibians (wood frog, spotted and blue spotted salamander and fairy shrimp) depend on vernal pools to lay their eggs successfully, since there are no predatory fish to eat them. The spring chorus of wood frogs and spring peepers was once heard throughout Harpswell, but is heard less often as their breeding vernal pools are lost to development. The silent salamanders leave their subterranean homes near the vernal pools and migrate to the water during early spring rains, sometimes over snow banks. Preserving the pools helps protect these small animals some of which are indicator species, detecting environmental hazards that have the potential to pollute groundwater and enrich our human experience of connecting with the wild world beyond our back yards. (See **Appendix 3** for more information on vernal pools)



Plovers, Stover's Point

2. High Value Plant and Animal Habitat, especially areas in an unfragmented condition, provide living conditions for diverse populations of native aquatic and terrestrial species, including fish, mammals, amphibians, reptiles,

insects and plants. Harpswell is home to numerous species of waterfowl and nesting birds, particularly on its islands. Arctic and roseate terns, little blue herons, snowy egrets and



Bald Eagle, Dan's Ice Pond

⁵ An ecosystem is a natural system consisting of plants, animals and microorganisms in an area that function together with all of the non-living factors of the environment.

wood ducks are frequently observed. As part of the Gulf of Maine watershed, 72 of the U.S. Fish and Wildlife Service's 91 priority species regularly inhabit Harpswell. They include bald eagles, ospreys, common loons, northern flickers, horseshoe crabs and alewives.

Protection of these natural resources is crucial to the health of Harpswell's adjoining clam flats and fisheries. (See **Appendix 4** for details.)

3. Our Recreational Resources are tied to our geography and outdoor open spaces. Residents' and visitors' participation in outdoor, natural recreation requires public access to the water and large undeveloped natural areas open to the public for hiking, cross-country skiing, fishing and hunting. During the Open Space planning process, the residents of Harpswell expressed a high level of interest in preserving open space for recreation. In addition, in a survey done by the Recreation Committee and Conservation Commission in 2007,⁶ respondents also expressed strong support for improving access to the water and expanding the trails in Harpswell.



The Town Lands Committee is working to ensure the Town Landings are accessible to the public for access to the water. The Harpswell Heritage Land Trust and the State owned properties which allow for recreation and permit access to the water. In addition, the recent adoption of a Master Plan for Mitchell Field represents the Town's commitment to provide a variety of outdoor recreational opportunities. The

Maine Island Trail Association also manages several local islands for low impact recreational use. (See **Appendix 5A and 5B** for a summary and inventory of protected recreational resources.)

4. Our Scenic Resources are widely recognized as a key feature of Harpswell's community character. The Town's rural areas afford expansive views of fields with long views to the water and picturesque islands. The village areas of Cundy's Harbor, Orr's and Bailey Islands are oriented around sheltered scenic harbors and working waterfronts, while the forested expanses cleanse our air and provide a transition between the rural and village areas. These resources are an important component of our open space and should be protected. (See **Appendix 6A and 6B** for a summary about scenic resources)



⁶Recreation Committee and Conservation Commission Open Space Survey Report, May 23, 2007; (**Appendix 9**).



5. Our Cultural, Civic & Historic Resources reflect Harpswell's rich maritime and farming heritage. Cemeteries provide habitats for birds and animals, as well as an important cultural resource for residents. Civic and cultural organizations include schools, libraries, fire departments and the Merriconeag Grange. The property owned by these organizations often includes undeveloped open space, as well as buildings. For example, the Harpswell Garden Club, Harpswell Historical Society, Bowdoin College and the Holbrook Community Foundation all own properties of historic or cultural importance. Most of these properties include undeveloped land. Due to its settlement patterns since 1758, Harpswell is rich in historic buildings and structures,⁷ having ten buildings, a bridge, an island and an historic district that are listed on the National Register of Historic Places. Much of Harpswell's unique identity relies on the protection of these key resources and their open spaces and as a result, they are included as priorities for protection. (See **Appendix 7A and 7B** for a description and inventory of these resources.

2B. A Vision for Open Space in Harpswell

This vision for open space in Harpswell is based on the 2005 Comprehensive Plan, the suggestions of the participants at the 2007 Open Space Forums and ideas of the respondents to the 2007 Recreation and Open Space Survey. (See **Appendix 8, 9, & 10**) The vision of the residents and taxpayers for the open space of Harpswell includes:

- **Preservation of Open Space:** The key open spaces that make Harpswell a desirable place to live and give it its quality of place shall be conserved for future generations to enjoy and appreciate.

⁷ 2005 Comprehensive Plan Update, page 115

- **Preservation of Water Quality:** The quality of the bays, rivers, ponds, vernal pools, wetlands and groundwater will be preserved in healthy condition for future generations.
- **Preservation and Stewardship of its High Value Natural Areas:** The animals, birds and other wildlife will continue to have habitat in which to live and prosper.
- **Preservation of Community Character:** The character of Harpswell will continue to be defined by the Town's coastal, small town, rural to village pattern, the preservation of public access to the sea and its natural, cultural, scenic and recreational assets.
- **Management of New Development:** New development will preserve the natural features of the land, create buffers between our roads, wetlands, streams and shoreline; and include open space.
- **Collaboration:** Community organizations, town government, landowners, developers, the public and representatives of adjacent towns will work together collaboratively to plan for, protect and manage the open space resources of the town.

**2005 Comprehensive Plan
Recommends that:**

- ♦ *the marine environment* be maintained as a high quality marine ecosystem
- ♦ *groundwater resources* be protected in order to provide a safe and adequate water supply.
- ♦ *the natural habitat* be preserved and protected to provide sufficient habitat to maintain the current diversity and health of wildlife
- ♦ *Harpswell's community character* be maintained by managing its growth and development to preserve its working waterfronts, historic neighborhoods and valuable natural resources
- ♦ *traditional public access* to the shore for swimming and boating be maintained

3. What is the Open Space Plan?

3A. Description of the Plan

An open space plan outlines a town's strategies for conservation of natural resources and preservation of recreational areas and community character. In 2006, at the request of the Comprehensive Plan Implementation Committee (CPIC), the Conservation Commission (HCC) began to develop an Open Space Plan for Harpswell. A grant application was submitted to the William P. Wharton Trust and funded for \$10,000. The Town of Harpswell hired the team of FB Environmental and MRLD Planners as consultants to assist the Conservation Commission and the Town in developing an Open Space Plan. In addition, the Maine Association of Conservation Commissions (MEACC) provided Harpswell with the free consulting services of conservation advisor, Marcel Polak.

The resulting Open Space Plan for Harpswell makes a variety of recommendations for the future of the community. By using input from residents (See **Appendix 9 and 10**) and identifying Harpswell's natural resources, it became apparent where development should not occur. An Open Space Plan provides the basis for addressing the challenge of growth against the widely recognized need to preserve community character and all the aspects it

embodies. It accomplished this balance by:

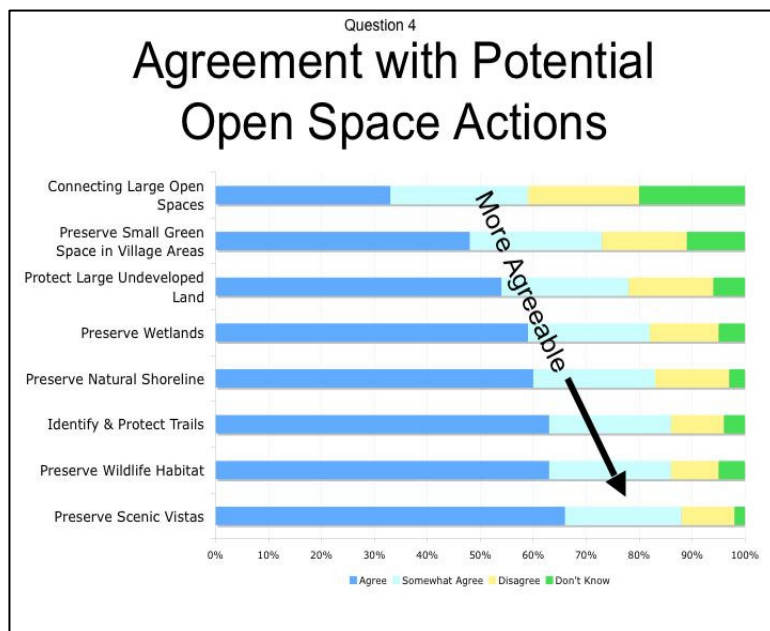
- Identifying, inventorying and mapping critical natural resources, wildlife habitats and open spaces
- Updating the open space resource inventory and the *1987 Critical and Scenic Areas Map*.
- Establishing a prioritization system for use when evaluating properties in the Town for conservation
- Enhancing public awareness about the benefits derived from Harpswell's diverse natural areas
- Providing a strategic and regulatory framework which the Town can use to meet its open space goals as articulated in the 2005 Comprehensive Plan

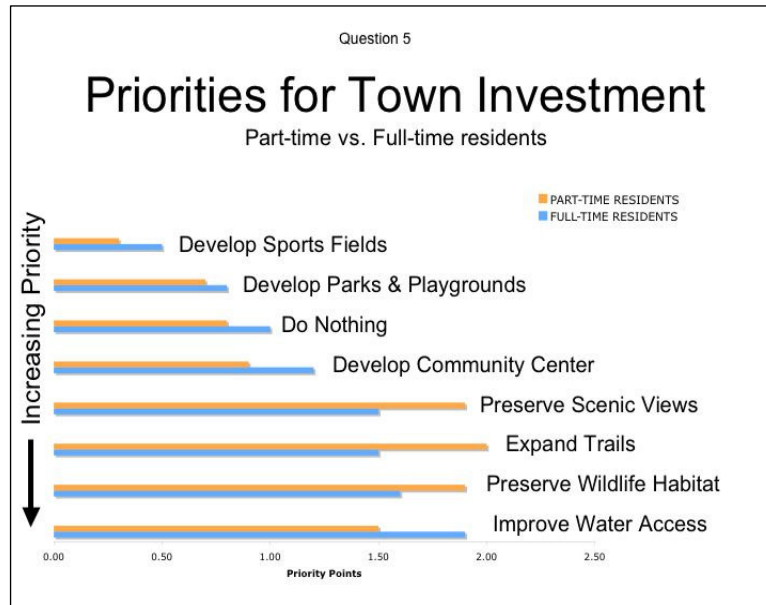
3B. The Plan's Development Process

1. Community Survey

One of the first steps in the process was to enlist the community's input as to their ideas for open space. Shortly after the approval of the update to the Comprehensive Plan, the Town of Harpswell carried out a representative survey of 517 Harpswell taxpayers to find out what the residents in Harpswell wanted in relationship to open space and recreational opportunities. (Please see **Appendix 9** for the details of the complete survey.) The majority of

respondents wanted to preserve scenic views and wildlife habitat, expand trails in town, preserve wetlands and protect large undeveloped parcels of land. When asked about the priorities for public spending, more residents wanted to preserve and expand passive recreation and open space than wanted to build facilities. Improved access to the water was the highest priority for half of the town taxpayers





Community Survey, Question 5

2. Public Workshops



Subsequently, on May 30, 2007, Harpswell residents participated in the first of two public workshops at the Harpswell Island School to help the Town of Harpswell develop an Open Space Plan. (Please see **Appendix 10** for the details of the two workshops.) The intent of the public forums was to establish the residents' priorities for which open spaces are most important to them for future protection.

During the forums, consultants provided a brief overview of state and regional open space protection efforts, along with a description of open space planning concepts. They then divided the forum participants into five breakout groups to establish the residents' priorities for preservation of 1) water resources, 2) natural habitats, 3) scenic, 4) cultural and historical resources and 5) outdoor recreational areas. Each breakout group was given a set of large-format maps for each of five types of open space. Facilitators encouraged participants to identify important locations and then prioritize these locations by "voting with colored dots", as well as, adding written comments on the maps.



The results of this process showed that the workshop participants' greatest single priority was to protect water resources (44%), followed by natural habitats (23.5%). Numerous

areas of Harpswell were identified for possible open space protection. **Map 2** at the end of this document shows the scenic areas identified by the workshop participants as high priority for preservation.

Conclusion

Based on the priorities expressed in the public survey and the two workshops, the Harpswell Conservation Commission concluded that the top priorities for conservation and preservation of open space in town are its water resources and natural habitat.

4. Assessing Harpswell's Open Space

4A. Topography of Harpswell

Looking to your right as you enter Harpswell traveling south on the Harpswell Neck Road,, your eye will travel past a coastal marsh, and continues over the rolling fields and apple orchard of the historic Merrucoonegan Farm, and rests on the barn on top of the hill. If you look to the left you will see the historic “Carrying Place”, named by the Native Americans. This freshwater wetland was used as a portage to Middle Bay from Harpswell Cove, greatly reducing the time it took for the trip.



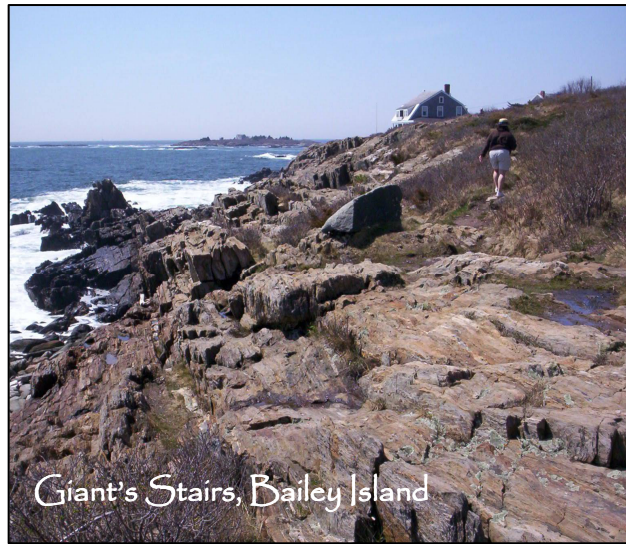
Merrucoonegan Farm,



The Carrying Place

View from Harpswell Neck Road traveling south.

Harpswell's topography is one of contrasts; from its pastoral rolling fields at its westerly entrance to its craggy island topography of its easterly shores.



To its open and closed water views



and to its rural and village scenes with green expanses and woodlands to the water.



4B. History and Accomplishments 1987 – 2008

Open Space and its relationship to the environment was addressed in the 1987 Comprehensive Plan. The Conservation Commission used this plan to do an analysis of our accomplishments as a town in the last 21 years in the preservation of open space. (Please see **Appendix 11** for the details.) In summary, we have:

- **Preserved Land:** In the last 20 years, we have made significant strides in preserving land. The Harpswell Heritage Land Trust (HHLT), other conservation groups, the Town of Harpswell and the State have preserved land through the acquisition of land and conservation easements. The Town Lands Committee has identified and clarified the ownership of our town lands. (See **Appendix 13C**)
- **Preserved Scenic Views:** In 1987, the town developed a map of scenic views which is used by the Planning Board to make decisions about the conservation of these views. (See **Map 1**) Scenic areas have been preserved. However, views from the water and along the roads have been impacted by the many new homes.
- **Preserved Natural Habitat:** A variety of natural habitats have been protected in Harpswell as the result of resource protection zoning and the preservation of land by HHLT, the Town, the State and other conservation and community groups.
- **Developed Recreation Resources:** The Town, HHLT and Bowdoin College have developed a series of recreational trails in Harpswell. A description of the trails is available on the Town of Harpswell and the Harpswell Heritage Land Trust websites. The Town Lands Committee has identified 18 landings which provide public access to the sea. (See **Appendices 5A & 5B**)
- **Preserved Cultural and Historic Resources:** The number of cultural and historic resources in Harpswell that have been preserved has increased over the past 20 years. The Harpswell Historical Society has played an active role in this process. (See **Appendices 7A & 7B**)
- **Added Land Regulations to Benefit Open Space:** Since 1987, land regulations at the State and town level have impacted positively on the conservation of our land and shoreline in Harpswell. Details about these regulations can be found in **Appendix 11**.

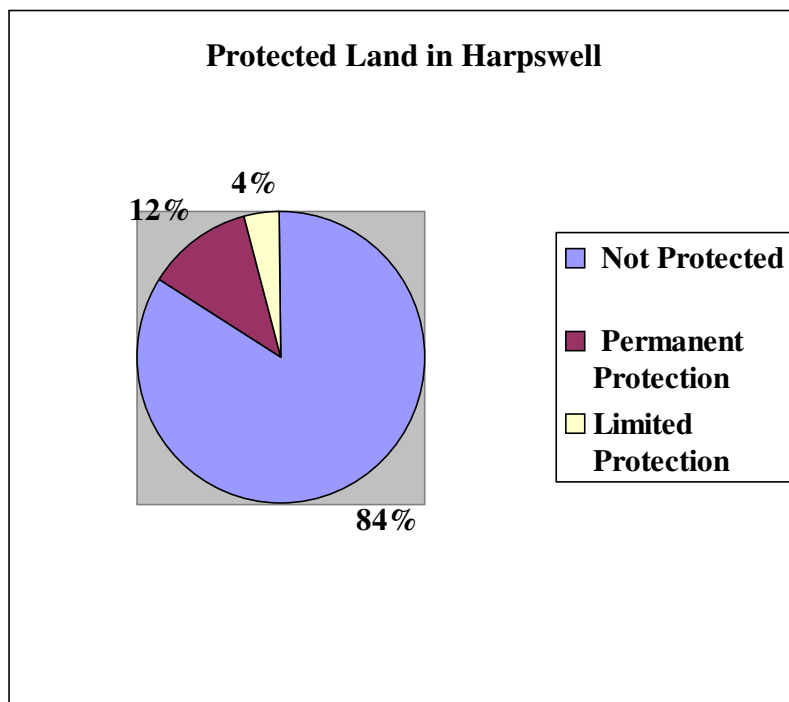
4C. How Much Protected Land Do We Have?

For purposes of this plan, the land in Harpswell is divided between **developed** and **undeveloped** land. **Developed** property is land with residential or commercial buildings and roadways on it. **Undeveloped** property is land without structures on it. Some of the undeveloped land may be difficult or impossible to develop because it is too steep, wet or rocky. The remainder of the undeveloped land can be developed in the future. (Please see

Appendix 12 for more details.)

1. Inventory of Undeveloped Protected Land

Fortunately, some of the undeveloped land in Harpswell is already protected from development because it is owned by or under easement to organizations whose mission is to preserve land or to serve the public. The *Inventory of Protected Land in Harpswell* (Appendices 13A, 13B and 13C) details this protected open space. Map 3 is a snapshot of existing protected open space properties in Harpswell. Some properties are **permanently protected** from development because they have legal constraints on the property that limit their use to conservation purposes only. The rest of these properties have **limited protection** because they are owned by governmental bodies or non-profit and educational institutions whose mission is to provide services to the community. These properties have varying forms of protection, but no legal mechanisms in place to prevent a change in their use as open space in the future.



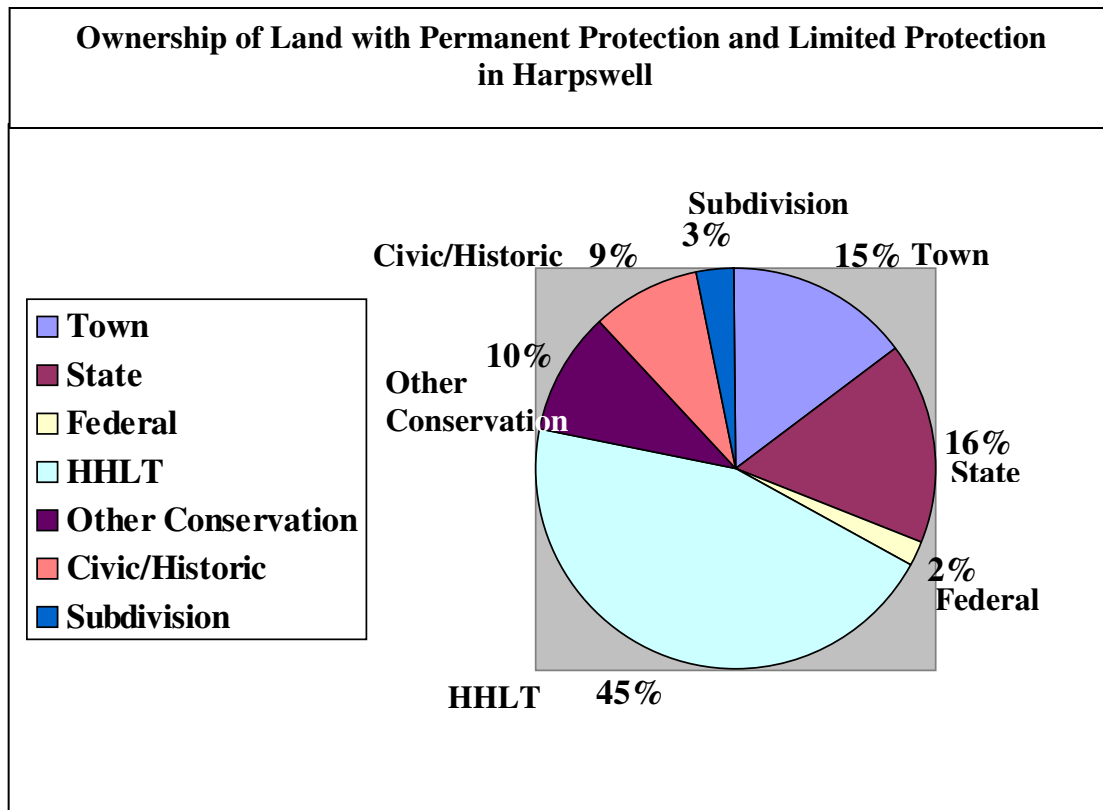
The Town of Harpswell has approximately **15,700 acres** of land. Of this amount, **16 %** of the land in town has permanent or limited protection from development, because of its ownership by governmental institutions or civic and conservation organizations. (Please see **Appendix 13B** for an inventory of these properties). This land is valuable for the preservation of our habitat, water resources, recreation assets and scenic views, as well as history and character of our town.

The Harpswell Heritage Land Trust, The Maine Coast Heritage Trust, The Nature Conservancy and Bowdoin College⁸ have preserved **55%** of the protected land in town. The Town of Harpswell, the State of Maine and the federal government account for another **33%** of this land. The remaining **12%** of this land is owned by a combination of civic, historic and cultural organizations and private individuals in subdivisions who own common land.

⁸ The Nature Conservancy conserves an island with important nesting habitat. The Maine Coast Heritage Trust preserves two islands. Bowdoin College owns three properties in Harpswell

2. Types of Protection

Although we have **2,518 acres** in Harpswell that are protected from development, only **1847 acres** are **permanently protected** from development as the result of conservation easements or deed restrictions on the use of the property. (Please see **Appendix 13C** for an inventory of this land). Of these 1847 acres, **469 acres** are owned by government agencies and **1378 acres** by non profit and educational organizations. The permanently protected state and federal lands have deed restrictions and other restrictions on them that make it unlikely for their use to change. In other words, **12%** of Harpswell's land is highly likely to remain as open space and provide habitat, water, recreational, scenic and/or civic, historic or cultural resources to the town.



The remaining **671 acres or 4%** have **limited protection** as the result of its ownership by organizations with public missions. These organizations could chose to change the use of their open space property. For example, the Town of Harpswell could sell selected town lands to generate funds for other uses. The Town could also change the use of its existing open spaces, for example, the Cliff Trail, to other uses, such as town or residential buildings. Civic, cultural and historic organizations and education institutions could sell their properties, if they choose. The chart below provides a summary of the types of the ownership of all of the 2,518 acres of protected land in Harpswell.

4D. How Do We Compare To Other Communities?

In April 2008, the Harpswell Conservation Commission gathered data⁹ to compare the amount of protected land in Harpswell to some other coastal towns in Midcoast Maine. As can be seen in **Appendix 14**, Harpswell has approximately the same amount of permanently protected land and land with limited protection as the median of the other six towns studied.

Harpswell is composed of a series of narrow peninsulas and islands, and is different topographically than four of the six towns. Harpswell has one of the longest coast lines of any town in Maine and as a result, probably has more unbuildable land than most of the other towns compared. In addition, as an “island community”, it has to protect natural resources that insure drinking water safety and availability. As a result, the HCC concluded that while it is useful to know how our undeveloped land compares, knowing how much to keep undeveloped depends entirely on the town and its unique natural resources.

5. Preservation of Open Space: What to Preserve?

5A. Resources to Preserve

A goal of the 2005 Comprehensive Plan is to guide development away from critical natural areas and essential wildlife habitat to minimize habitat fragmentation. In addition, citizens consistently cite water resources and natural areas as the two most important resources for conservation and preservation. Therefore, water resources and high value habitat were used as the basis for identifying areas for open space preservation.

- ***Water Resources*** considered in this plan are freshwater and coastal wetlands, and coastal marshes as described in the National Wetlands Inventory (NWI), vernal pools, eelgrass and shellfish beds and streams and ponds identified by the United States Geological Survey (USGS).
- ***High Value Plant and Animal Habitat*** as determined by using data compiled by the Maine Department of Inland Fisheries and Wildlife. (Maine Department of Marine Resources and Maine Natural Areas Program. (See **Appendix 8** for mapping components).

In addition, the Open Space Plan includes Harpswell’s ***Recreational, Scenic, and Civic, Cultural and Historic Resources*** as areas to emphasize and protect.

⁹ Please note that the data was gathered in April 2008. After April, the HCC updated the list of protected properties in Harpswell and so the average totals used in April are slightly different than the data presented elsewhere in this document. The HCC decided to keep the April 2008 numbers for purposes of this comparison because the data from the other towns was obtained in April and has not been updated since that time.